

ABSTRACT OF THE DISCLOSURE

A scroll thrust bearing having both-end conical rollers are rolling elements, being low in cost, high in precision, large in load capacity, and excellent in durability. A plurality of both-end conical rollers are held rotatably between a pair of bearing plates, and the relation of the scroll swirl radius (R) of both-end conical roller and the dimension (H) between opposite tracks of the both bearing plates is set in a range of $1 < H/R < 5$. As compared with the preset scroll swirl radius (R) of both-end conical roller, the section curvature in the contact portion with the tracks of the both bearing plates of the conical surfaces of the both-end conical roller is kept as small as possible in a practical range, so that the surface pressure acting on the conical surfaces of the both-end conical roller is kept as small as possible.